

REMARKS

Applicants' representatives thank the Examiner for the courtesy of an in-person interview on October 8, 2003. This amendment addresses substantive points discussed during interview. The Applicants are not aware of any substantive points discussed that are not contained within this amendment. Accordingly, this amendment constitutes a complete written statement of the reasons presented in the interview as warranting favorable action, as required by 37 C.F.R. §1.33.

Applicants believe that this amendment is responsive to the Office Action of May 29, 2003, with a petition for a two month extension of time. Accordingly, Applicants believe that the Final Office Action, mailed September 29, 2003, is in error. Applicants petition to have the Final Office Action withdrawn. The petition is enclosed herewith. For purposes of completeness, this response addresses both issues raised in the Office Action of May 29, 2003, as well as those raised in the Final Office Action of September 29, 2003.

Claims 7 and 8 have been amended to add clarity. Support can be found throughout the specification, for example at page 11, line 3.

Claim 1 has been amended to recite a non-predeterministic arrangement. Support for this amendment can be found throughout the specification, for example, on page 7, lines 25-28 ("In some embodiments individual components include contact surface areas that are non-distinguishable by other components, that is, a second component can contact any of a number of contact surface areas of a first component with equal likelihood, and equal energy associated with contact."), on page 14, lines 26-28, or Fig 3.

Claim 1 also has been amended to recite allowing *at least* a first, second, third, and forth component to assemble. This amendment simply clarifies the fact that additional components can exist, as supported by, for example, claim 4 as filed which recites additionally a fifth component. Support can be found also throughout the specification, and in the figures, for example in Fig. 3.

New claim 16 has been rewritten from originally filed claim 1, further reciting a component that has a mating surface that is rotationally symmetric. Support for this amendment can be found throughout the specification, for example, on page 11, lines 26-31, or page 13, lines 1-3, or Figs. 1-2.

New claim 25 has been rewritten from original claim 1, further reciting an I/O connection for an integrated circuit. Support for this amendment can be found throughout the specification, for example, on page 12, lines 26-31, page 13, lines 16-17, page 15, lines 6-7, or Fig. 3.

New claim 34 has been rewritten from original claim 1, further reciting a porous arrangement. Support for this amendment can be found throughout the specification, for example, on page 15, lines 10-13.

Claims 1-9 and 16-42 are now pending in the application.

Information Disclosure Statement

Enclosed herewith is an Information Disclosure Statement.

Drawings

Formal drawings have been previously submitted on July 29, 2003. These drawings were previously filed to meet the two-month period of time required by the Patent Office.

Specification

The Patent Office has objected to the Abstract as not sufficiently describing the claimed invention. Applicants respectfully disagree. It is believed that the Abstract satisfies the requirements of 37 CFR §1.72 and MPEP §608.01(b). The Abstract is sufficient to allow the public to determine quickly from a cursory inspection the nature and gist of the technical disclosure.

The Patent Office has also objected to the title, as being not descriptive. Applicants respectfully disagree. Applicants believe that "Self-Assembled Electrical Networks" is descriptive of the claims in the broadest form to which Applicants are entitled. If the Patent Office continues this objection, then Applicants respectfully suggest that the title be amended near the close of prosecution, when the scope of the allowable claims has been determined.

Claims Objections

Claim 1 was objected to, as the Patent Office states that the limitation "component" should be "components." Applicants respectfully disagree. It is believed that the term

“component” (singular) is grammatically correct as presented in the claims, and it is respectfully requested that the objection be withdrawn.

The limitation “electrical communication” in line 3 of claim 8 was objected to. The Patent Office states that the limitation should be “the electrical communication.” Applicants believe that the phrase “the allowing step involving establishing electrical communication between the electrical devices of the respective components” is grammatically correct. Thus, it is respectfully requested that the objection be withdrawn.

Rejections under 35 U.S.C. §112

Claim 1 was rejected under 35 U.S.C. §112 ¶2, as the term “the direction” in line 3 did not have proper antecedent basis. Applicants believe that “the direction,” as used in line 3, refers to an inherent property of the claim, and thus does not necessarily require antecedent basis to be proper. Applicants believe that the claim is definite, and would allow one of ordinary skill in the art to understand the scope of the claim.

The limitation “electrical conductor” in claim 8 was rejected as being vague and indefinite. Applicants note that “conductor” is not found in claim 8, yet have amended claim 8 to read “the electrical connector.”

The Patent Office has also rejected claim 8 for being vague and indefinite for the limitation “an electrical circuit.” Applicants have deleted language including that term from claim 8.

Rejections under 35 U.S.C. §102(e)

Claims 1-9 were rejected under 35 U.S.C. §102(e) as being anticipated by Bowden, et al., U.S. Patent No. 6,507,989 (“Bowden”). Applicants do not see where in Bowden is a non-predeterministic electrical circuit described, nor do Applicants see where in Bowden is a mating surface that is rotationally symmetric, electrical circuit comprising an I/O connection for an integrated circuit, or a porous non-planar arrangement of components disclosed or suggested. Accordingly, it is respectfully requested that the rejection of claims 1-9 be withdrawn.

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CONCLUSION

In view of the foregoing amendments and remarks, this application should now be in condition for allowance. A notice to this effect is respectfully requested. If the Examiner believes, after this amendment, that the application is not in condition for allowance, the Examiner is requested to call the Applicants' attorney at the telephone number listed below.

If this response is not considered timely filed and if a request for an extension of time is otherwise absent, Applicants hereby request any necessary extension of time. If there is a fee occasioned by this response, including an extension fee, that is not covered by an enclosed check, please charge any deficiency to Deposit Account No. 23/2825.

Respectfully submitted,
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